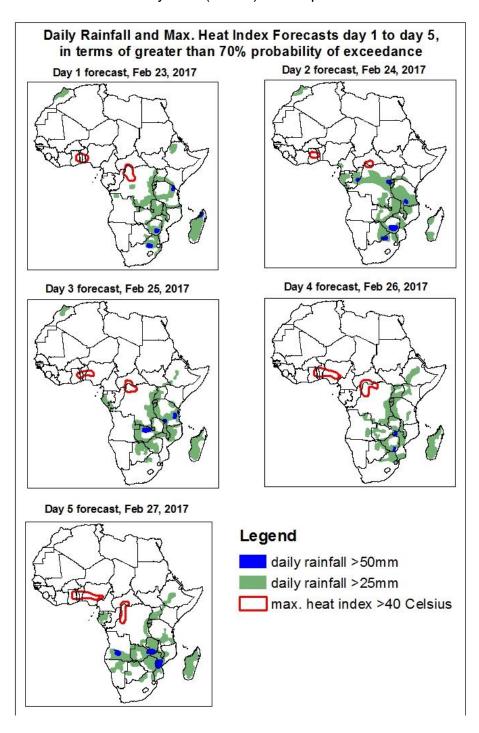
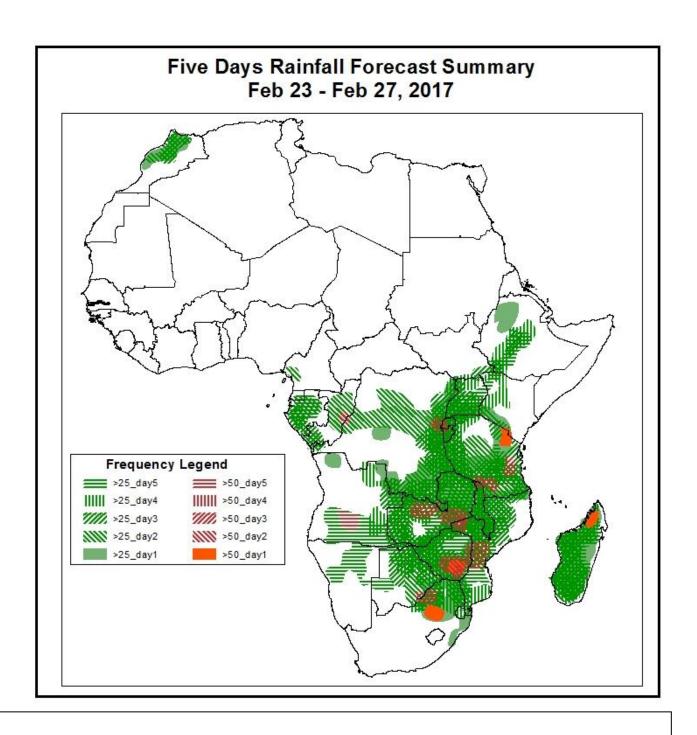
1. Rainfall, Heat Index and Dust Concentration Forecasts, (Issued on Feb 22, 2017)

1.1. Daily Rainfall and Maximum Heat Index Forecasts (valid: Feb 23– Feb 27, 2017)

The forecasts are expressed in terms of high probability of precipitation (POP) and high probability of maximum heat index, based on the NCEP/GFS, ECMWF and the NCEP Global Ensemble Forecasts System (GEFS) and expert assessment.



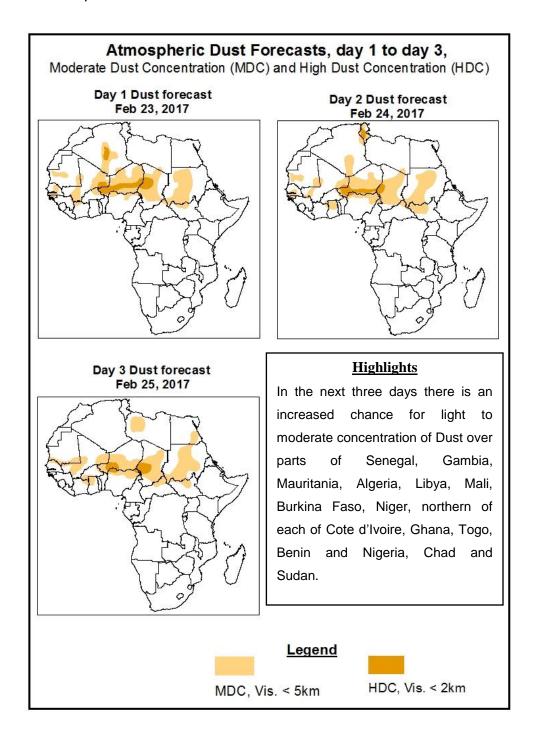


<u>Highlights</u>

In the next five days, lower level wind convergences across the Central and South African countries are expected to enhance rainfall in their respective regions. Therefore, there is an increased chance for two or more days of light to moderate rainfall over portions of Gabon, Equatorial Guinea, Congo, DRC, Uganda, Rwanda, Burundi, Tanzania, Zambia, Malawi, Mozambique, Botswana, Zimbabwe, Swaziland and Madagascar, local areas of Morocco, Ethiopia, Kenya, Angola, South Sudan, and South Africa.

1.2. Atmospheric Dust Concentration Forecasts (valid: Feb 23 – Feb 25, 2017)

The forecasts are expressed in terms of high probability of dust concentration, based on the Navy Aerosol Analysis and Prediction System, NCEP/GFS lower-level wind forecasts and expert assessment.



1.3. Model Discussion, Valid: Feb 23– Feb 27, 2017

The Azores High Pressure system over the North Atlantic Ocean is expected to weaken with its value of the central pressure decreasing from 1027hPa to 1025hPa in the next 72 hours and intensify with its value of the central pressure increasing to 1031hPa during the remaining forecast period.

The St. Helena High Pressure system over the Southeast of the Atlantic Ocean is expected to intensify with its value of the central pressure increasing from 1022hPa to 1028hPa in the next 72 hours and weaken to 1021hPa during the remaining forecast period.

The Mascarene High Pressure system over the Southwest Indian Ocean is expected to intensify with its value of the central pressure increasing from 1024hPa to 1027hPa in the next 72 hours and weaken to 1024hPa during the remaining forecast period.

At 925hPa, strong dry Northeasterly to Easterly winds may lead from light to moderate dust concentration over parts of Senegal, Gambia, Guinea-Bissau, Mauritania, Algeria, Tunisia, Libya, Egypt, Mali, Burkina Faso, Niger, northern of each of Cote d'Ivoire, Ghana, Togo, Benin and Nigeria, Chad and Sudan.

At 850hPa level, lower level wind convergences are expected to prevail over Cameroon, Congo, CAR, DRC, Uganda, Angola, Zambia, Namibia, Botswana, Zimbabwe, Mozambique, South Africa and Madagascar.

In the next five days, lower level wind convergences across the Central and South African countries are expected to enhance rainfall in their respective regions. Therefore, there is an increased chance for two or more days of light to moderate rainfall over portions of Gabon, Equatorial Guinea, Congo, DRC, Uganda, Rwanda, Burundi, Tanzania, Zambia, Malawi, Mozambique, Botswana, Zimbabwe, Swaziland and Madagascar, local areas of Morocco, Ethiopia, Kenya, Angola, South Sudan, and South Africa.

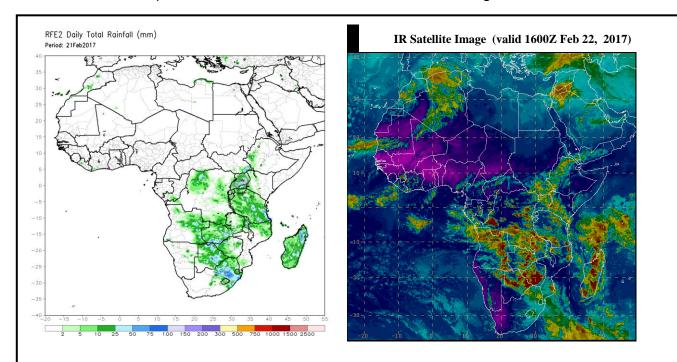
2.0. Previous and Current Day Weather over Africa

2.1. Weather assessment for the previous day (Feb 21, 2017)

Light to moderate rainfall was observed over portions of Morocco, Libya, South Sudan, Ethiopia, Cote d'Ivoire, DRC, Uganda, Tanzania, Angola, Zambia, Malawi, Mozambique, Namibia, Botswana, Zimbabwe, South Africa, Lesotho, Swaziland and Madagascar.

2.2. Weather assessment for the current day (Feb 22, 2017)

Intense convective clouds are observed over portions of Guinea, Liberia, Cote d'Ivoire, CAR, Ethiopia, Gabon, Congo, DRC, Uganda, South Sudan, Kenya, Tanzania, Angola, Zambia, Malawi, Mozambique, Namibia, Botswana, Zimbabwe and Madagascar.



Previous day rainfall condition over Africa (Left) based on the NCEP CPCE/RFE and current day cloud cover (right) based on IR Satellite image.

Authors: Eklou Ferdinand (Cote d'Ivoire – Met) / (CPC-African Desk); <u>ferdinand.eklou@noaa.gov</u>